10

20

Authentication of Remote Appliance Messages Using an Embedded Cryptographic Device

ABSTRACT

A method for authenticating appliance messages sent between an appliance and an appliance communication center appliance over an communications network includes maintaining a shared message counter at both the appliance communication center. A shared message counter at both the appliance communication center and the remotely located appliance. An authentication algorithm is applied to the appliance message and the shared message counter generate an authentication word. The appliance message is then transmitted to the appliance or the communication center along with the authentication word. Upon receiving the appliance message, the appliance or the communication center will apply an authentication algorithm to the appliance message and the shared counter to generate an authentication word. The generated authentication word may be compared to the word received with the appliance message to determine authenticity of the message.